

CLAIMS

What is claimed is:

- 1 1. A peptide according to formula 1
2 (formula 1) $(X1)_n$ -A-A-V-A-L-L-P-A-V-L-L-A-L-L-A-P-(X2)_m
3 wherein X1 and X2 are selected from one or more charged amino acid residues
4 such that each X1 and each X2 may be the same or different charged amino acid
5 residue, further wherein n has a value of 0 or 3-10, and m has a value of 0 or 3-10.
- 1 2. The peptide according to claim 1, wherein either m=0 or
2 n=0, wherein if m = 0, n has a value from 4 to 10, and if n = 0, m has a value
3 from 4 to 10.
- 1 3. A peptide according to formula 2
2 (formula 2) $(X1)_n$ -P-A-V-L-L-A-L-L-A-(X2)_m
3 wherein X1 and X2 are selected from one or more charged amino acid residues
4 such that each X1 and each X2 may be the same or different charged amino acid
5 residue, further wherein n has a value of 0 or 3-10 and m has a value of 0 or 3-10.
- 1 4. The peptide according to claim 3, wherein either m=0 or
2 n=0.
- 1 5. A pharmaceutical composition, comprising an antiviral
2 peptide and a pharmaceutically acceptable carrier, wherein the pharmaceutical
3 composition is effective for treating or preventing viral infections in a mammalian
4 host.
- 1 6. The pharmaceutical composition according to claim 5,
2 wherein the antiviral peptide further comprises a solubility tag.

1 7. The pharmaceutical composition according to claim 5,
2 wherein the antiviral peptide is selected from the group consisting of SEQ ID NOS:
3 1-15, SEQ ID NOS 18-30, fragments thereof and derivatives thereof, wherein if the
4 antiviral peptide is SEQ ID NO:14, SEQ ID NO:15, a fragment or derivative
5 thereof, then X1 and X2 are selected from one or more charged amino acid residues
6 such that each X1 and each X2 may be the same or different charged amino acid
7 residue, further wherein n has a value of 0 or 3-10, and m has a value of 0 or 3-10.

1 8. The pharmaceutical composition according to claim 7,
2 wherein the antiviral peptide is selected from the group consisting of SEQ ID
3 NOS: 1-13.

1 9. The pharmaceutical composition according to claim 7,
2 wherein the antiviral peptide is selected from the group consisting of SEQ ID
3 NOS: 14-15.

1 10. The pharmaceutical composition according to claim 7,
2 wherein the antiviral peptide is SEQ ID NO:14, wherein m=0 and n has a value
3 of 4 to 10.

1 11. The pharmaceutical composition according to claim 5,
2 wherein the composition is effective at treating or preventing infections from
3 enveloped viruses.

1 12. The pharmaceutical composition according to claim 11,
2 wherein the composition is effective at treating or preventing infections from one or
3 more viruses selected from the group consisting of human immunodeficiency virus,
4 herpes simplex viruses and cytomegalovirus.

1 13. The pharmaceutical composition according to claim 12,
2 wherein the composition is effective at treating or preventing infections from one or
3 more herpes simplex viruses.

1 14. The pharmaceutical composition according to claim 5,
2 wherein the composition is effective at treating or preventing infections from
3 nonenveloped viruses.

1 15. A method of treating or preventing a virus infection in a
2 warm blooded animal comprising administering to the animal an effective amount of
3 the pharmaceutical composition according to claim 5.

1 16. A method of treating or preventing a virus infection in a
2 warm blooded animal comprising administering to the animal an effective amount of
3 the pharmaceutical composition according to claim 10.